



O&M and Metering Guidance

Federal Utility Partnership Working Group

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FEMP
Federal Energy Management Program

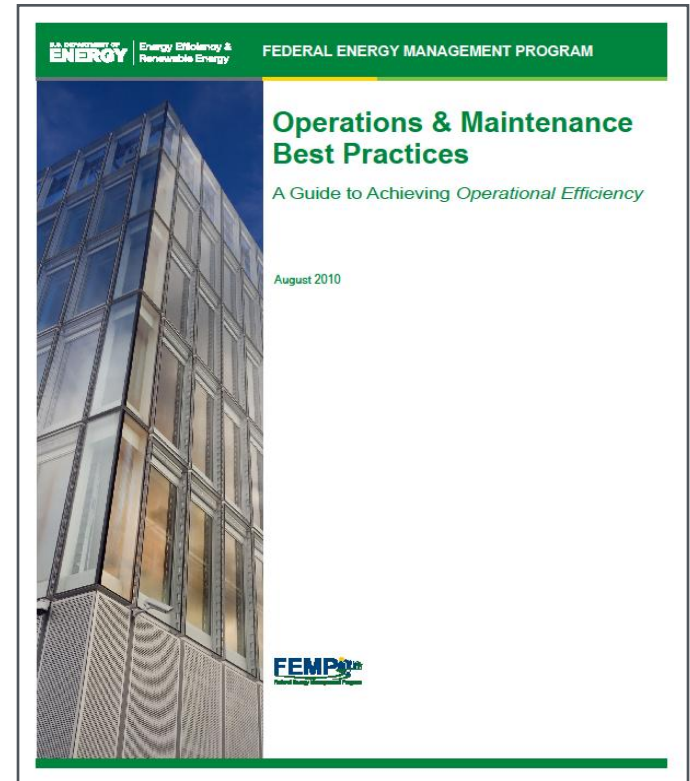
FEMP Mission Statement

“The Federal Energy Management Program facilitates the Federal government’s implementation of sound, cost-effective energy management practices to enhance the nation’s energy security and environmental stewardship”

O&M Best Practice Guidance Release 3.0 – **August 2010**

General Updates Include:

- Updated graphics, charts and tables
- Updated publication format and ability to access specific sections (thumbnails)
- Updated appendices
- Updated cost information, URL links, and references
- Improved document “*readability*”
- Added information regarding water



Release 3.0 Specific Updates/Additions

- **Chapter 1 – *Introduction and Overview***
 - New layout and inclusion of water
- **Chapter 2 - *Why O&M***
 - Updated information regarding importance of O&M
 - Updated information regarding legislative changes and Executive Orders
- **Chapter 3 – *O&M Management***
 - *Added information regarding benchmarks, contract types, and ESPC perspective*

Release 3.0 Specific Updates/Additions (Cont.)

- **Chapter 4 – *Computerized Maintenance Management***
 - Updated information regarding CMMS evaluation and selection
 - Added information regarding CMMS and EMCS integration
- **Chapter 5 – *Types of Maintenance Programs***
 - Better discussion regarding need and program development
- **Chapter 6 – *Predictive Maintenance Technologies***
 - Added overview table of predictive applications
 - Added predictive equipment description and cost information
 - Added sections of predictive equipment training

Release 3.0 Specific Updates/Additions (Cont.)

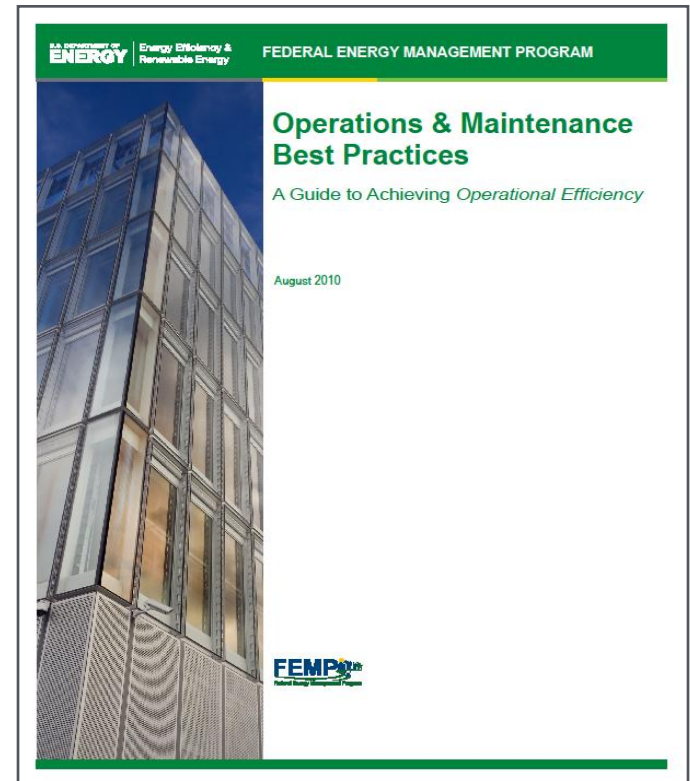
- **Chapter 7 – *Commissioning of Existing Buildings***
 - Updated information on types of commissioning and cost
 - Added new section on benchmarks for commissioning
- **Chapter 8 – *Metering for Operations and Maintenance***
 - Updated information regarding legislative requirements
 - Provided business case for metering and information regarding metering hierarchy
 - Updated section on metering economics, planning, and financing options
 - Updated information regarding legislative changes and Executive Orders

Release 3.0 Specific Updates/Additions (Cont.)

- **Chapter 9 – *O&M Ideas for Major Equipment Types***
 - Updated all sections with current data, relevant technologies and resources
 - Added sample efficiency calculations and examples for most sections
 - Added new section on “Air Handling Systems”
 - Added information on Available Software Tools to most sections
 - Added information on “Water-Use Best Practices”
- **Chapter 10 – *O&M Frontiers***
 - Updated information regarding offerings from vendors and contacts

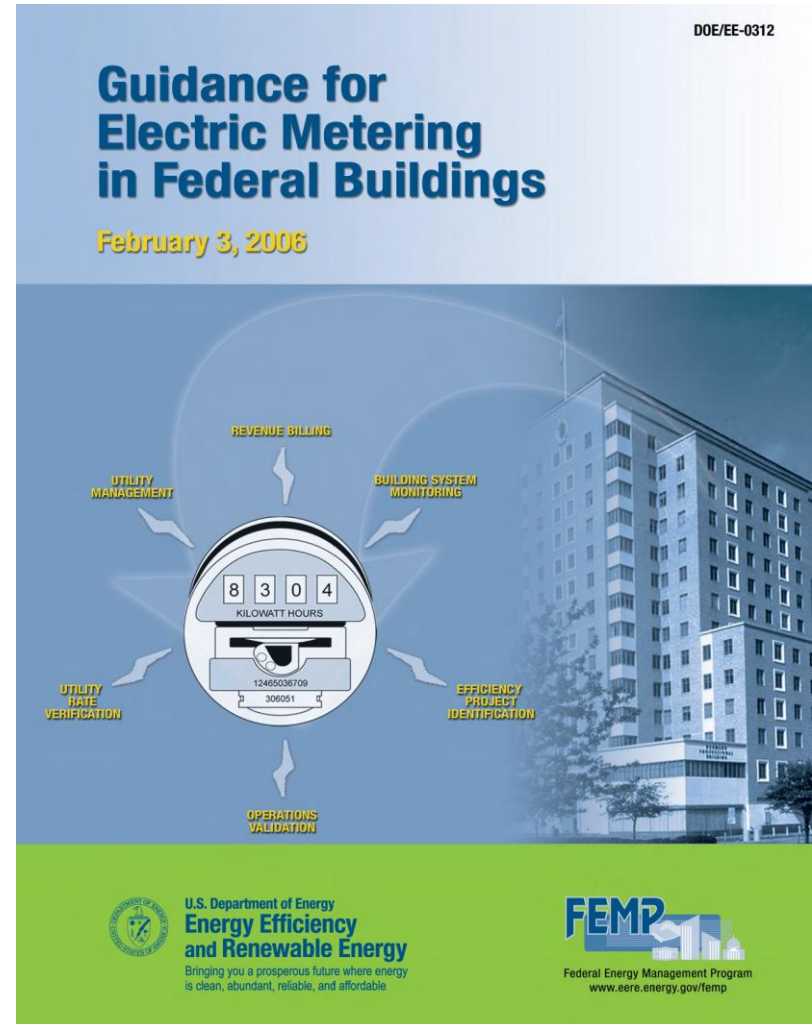
Other notes of interest

- Document available on FEMP website
- Document size has increased by ~50%!
- Release 2.1 scheduled for fall of 2010 to address late review comments
- e-based related training course available for “test drive” in near future



Metering Guidance Document

- Prepared in response to Section 103 of EPAAct 2005
- Document addressed only electric metering
- Original intent was to modify document to incorporate EISA requirement regarding steam and gas metering – Sect. 434 (b)
- Updated via a supplement directing readers to Metering Best Practice Guide



- Companion document to metering guidance document is the **Metering Best Practice Guide**
- Release 2.0 planned for spring of 2011
- Revised outline developed, new sections under development
- Next release will include updated economics for electric, gas, steam, and water metering
- Address aspects of smart grid, and how agencies can be prepared to take advantage of smart grid technologies



How can FUPWG members help?

- Provide comments to O&M Working Group
- Share information regarding both O&M and metering success stories at your sites
- Provide ideas on other products of importance to your agency to the O&M Working Group

Your FEMP Point of Contact For O&M and Metering related activities

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Questions or Comments?